

REMARKS

Reconsideration of the application is respectfully requested for the following reasons:

1. Rejection of Claims 1-3 and 5 Under 35 USC §102(b) in view of U.S. Patent No. 3,733,482 (Miller)

Reconsideration of the rejection of claims 1-3 and 5 is respectfully requested on the grounds that the Examiner has misinterpreted the applied reference (Miller). Fig. 3 of Miller does not show lamps with a single connection end, as claimed, but rather shows first legs of two-legged “U-shaped” fluorescent lamps connected to and support by two sockets, rather than a single socket, as claimed. The second leg and socket of each of the lamps is hidden in the view of Fig. 3 of the Miller patent, but Fig. 8 shows the same U-shaped lamps in different fixtures with two legs and two connections ends connected to two sockets.

Claim 1 specifically recites that “*each said compact fluorescent lamp is supported by a **single** one of said respective sockets and electrically connected to said ballast mechanism **solely** by said one electrical connection end. . .*” This claim language means that each lamp can only be supported at one end, and connected to a single socket. No lamp can be supported at two ends or connected to two sockets. Furthermore, claim 1 requires that the sockets be connected to the ballast mechanism by a plurality of wires, rather than being integral with the ballast mechanism. This arrangement enables the sockets to be mounted at different locations after the ballast mechanism is fastened.

In contrast, the Miller patent discloses a conventional fluorescent lamp tube supported at two ends and connected to two sockets, with a ballast mechanism that is provided on base 13 and integral with the sockets. While the lamp tube of Miller is U-shaped rather than linear, it is nevertheless supported at two ends of the lamp, rather than a single connection end as claimed, and clearly requires electrical connection to two sockets for each lamp, the sockets being provided on the base that holds the ballast.

It is true that the lamps shown in Fig. 3 of Miller look like they are supported at only one end. However, this is because Fig. 3 of Miller is a vertical cross-section that only shows one leg of the “U-shaped lamps.” The “U-shaped lamps” shown in Fig. 3 are actually supported at two ends and connected to two sockets, as can be seen in Fig. 4, which is a top view of a similar embodiment that clearly shows both legs in a horizontal section, and Fig. 8, which is a side view that shows the entire U supported at two ends with two sockets.

The descriptions of Figs. 3, 4, 5, and 8 clearly support the interpretation of Fig. 3 as showing conventional U-shaped lamps with two sockets. For example, col. 4, lines 2-4 state that:

*. . . Fig. 3 shows a **pair of U-shaped lamps** 30 and 31 secured by sockets 32 and 33 in an inverted or suspended position in parallel side-by-side relation, . . .*

while col. 4, lines 43-47 state that:

*. . . In this case, a single lamp 40 within a rectangular diffuser 25 is positioned with the legs upstanding generally along a diagonal to the enclosure. The lamp **legs 40A and 40B**, of course, are connected with a U-section and unshown in sectional view FIG. 4.*

and col. 5, line 67 to col. 6, line 3 states that:

*. . . Contained within the member 52 is at least one **U-shaped lamp** 53 oriented vertically and enclosed within a beam-splitting diffuser of the types illustrated in FIGS. 8A and 8B.*

Although Figs. 3, 4, and 8 show different embodiments, the different embodiments all use the same “U-shaped lamp,” i.e., that lamp shown as being connected at two ends in Fig. 8 is the same as the lamps shown in Figs. 3 and 4, the only difference being that the legs of the U are hidden in Fig. 3. There is no reason to believe that the lamp clearly shown as being connected at two ends in Fig. 8 is different from the lamp shown in Fig. 3. To the contrary, Fig. 5 shows a light distribution for a lamp with left and right legs that is said to correspond to Fig. 3.

Further evidence that the lamps of Miller are connected at two ends is found in the description of prior art in col. 1, lines 47-59, which describes the U-shaped lamps, as follows:

. . . A problem exists which is peculiar to the design of luminaires using fluorescent U-shaped lamps. This problem is related to the very non-uniform light output from the lamps. The U-shaped lamp is relatively dim near the lamp

bases, emitting very little usable light in the first few inches of tube. Conversely, the bent portion of the "U" is much brighter than the areas nearer the bases. Also it has been found that the inner portions of the length of the legs is considerably brighter than the outer portions of the legs. This because the light radiated from one leg illuminates the oppose leg and is re-reflected from the opposite leg [emphasis added].

Indeed, the primary purpose of the invention of Miller is to provide a diffuser between the legs of the conventional U-shaped fluorescent lamp to eliminate the problem of dimness near the lamp "bases." Miller does not refer to a single lamp base, but to lamp bases. If only a single lamp base were involved, the disclosure of Miller would not make sense.

When the disclosure of Miller is read as a whole, in the manner that it would have been read by the ordinary artisan, it is clear that the disclosure concerns U-shaped lamps with two sockets as shown in Figs. 4, 8, and 9. The appearance of a single socket in Fig. 3 is a result of the view, with the second socket of each lamp being hidden behind the first socket, and not because the "U-shaped lamps" of Fig. 3 are different than those of Fig. 8, or those described in the introductory portion of Miller's specification.

With regard to the recitation of wires between the ballast and single socket, it is respectfully submitted that the Examiner has mis-interpreted elements 12, 13, 14, 34, and 35 as the ballast mechanism. This interpretation, while creative, ignores the description of element 34 only as the "ballast" (col. 4, lines 2-11), and the usual understanding in the art that the ballast does not include the housing (35), as suspension rod or tube (12), fixture base (13), and a diffuser housing (14). Furthermore, even if all of the listed elements were interpreted as the ballast, the resulting "ballast" would still not be connected to socket sets 31,32 by wires in the manner claimed since the sockets are fixed to the base 13.

Because the rejection is based on a misunderstanding of Fig. 3 of the Miller patent as disclosing single-ended connection of lamps, and a mis-interpretation of the word "ballast," it is respectfully submitted that the rejection of claims 1-3 and 5 is improper and should be withdrawn.

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2. Rejection of Claim 6 Under 35 USC §103(a) in view of U.S. Patent Nos. 3,733,482 (Miller) and 6,194,840 (Chang)

This rejection is again respectfully traversed on the grounds that the Chang patent, like the Miller patent, fails to disclose or suggest fluorescent lamps are each supported and electrically connected at one end by a single respective socket, the single sockets in turn being supported by the ballast which is mounted to a fixture, the ceiling, or a wall. Instead, the Chang patent is completely silent as to the construction of the socket, its connection to the ballast, and mounting of the ballast. Accordingly, withdrawal of the rejection of claim 6 under 35 USC §103(a) is respectfully requested.

Having thus overcome each of the rejections made in the Official Action, withdrawal of the rejections and expedited passage of the application to issue is requested.

Respectfully submitted,

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